NASA(P)	Good morning, and welcome to our chat with NASA Chief Scientist Waleed Abdalati and Chief Technologist Mason Peck. We'll get started here in just a moment.
jeffwallace(Q)	What are your committments to, and expectations of, the Game Changing Technology and NASA Innovative Advanced Concepts programs?
NASA(A)	Both programs are very exciting new ways that NASA is engaging with the community of engineers and scientists that hope to contribute to NASA's future missions. NIAC brings in revolutionary, very new ideas that are at least 10 years in the future.
NASA(P)	How do you see your roles intersecting? (question from Vanessa Roberts) Our roles are intimately connected. Technology enables science and science guides technology. The combination of the two are what enables NASA to accomplish the great things we do.
mmealling(Q)	question: Surrey Satellite lists their basic satellite platforms starting at $10 million. Can the CTO's office do anything to help lower those costs?
NASA(A)	NASA is embracing small satellite technology. In fact, we have an open call for proposals for the Edison Program which is soliciting ideas for small sat technology demonstrations.
Geoff(Q)	Hi, might be silly question, but, are there any scientists, engineers etc that are trying to develop engines that will allow us to travel at the speed of light or rather do you see us developing technology that will allow us to travel the galaxy and explore? If so, when will this technology be developed?
NASA(A)	What we know about physics today won't let us travel at the speed of light. But NASA will continue to push the boundaries of propulsion to make human and science missions go farther, faster.
AerialAces(Q)	Will NASA complete the James Webb telescope, and if so how long is it projected to take?
NASA(A)	Yes, NASA will complete the JWST. We are planning to launch in 2018. We are confident of this date as the major technologuical hurdles have been cleared.
dku(Q)	Would you say that LaGrange points are now higher in priority than robotic explorations of planets given tighter funding?
NASA(A)	LaGrange points are not a higher priority, rather we are working to assess the value of various destinations for both science and human exploration in an integrated manner.
Vanessa_Roberts(Q)	How are your efforts going to consolidate/optimize your data centers and how does that help with your scientific R&D initiatives?
NASA(A)	The Open Government initiative has led to NASA's creating the data.nasa.gov site. There the public can find science data, NASA technology data, and more. NASA will be posting even more in the near future, so keep watching.
Bob_Ray(Q)	Will the Edison Program get any funding? Open calls are great, but without funding, of not much use...

NASA(A)	The Edison Program is funded now, and is also included in the FY 2013 budget request.
ernie(Q)	Completing the JWST seems to come at the cost of severe cuts to planetary science. Do you feel that NASA is striking a good balance between those objectives?
NASA(A)	NASA maintains a very robust program of planetary sciences, and in science in general, with over 80 missions either in operation or development. In planetary, in the last year alone, we have entered obit around Mercury, launched a mission to Jupiter, a mission to the moon, are orbiting the asteriod Vesta, and have a tremendous currently to the surface of Mars.
JimGrey(Q)	Will small sat tech include Amateur Radio?
NASA(A)	NASA has been offering launch opportunities for very small satellites through the ELaNa program. These launches are available for private individuals, academic institutions and others. In many cases, amateur radio communications is the right solution for those missions.
ernie(Q)	How does NASA move forward with the priorities in the new FY 13 budget proposal, knowing that a new administration could have different priorities for NASA?
NASA(A)	This is an issue that comes up every election cycle, however the ambitious exploration goals require longer term planning. NASA has wide bipartisan support, that makes us confident we are going to be able to achieve those goals. Our science and technology priorities are informed through community consensus and we expect them to endure.
jeffwallace(Q)	Many people may not know that ion propulsion is a reality - the Dawn mission has demonstrated that (thank you JPL Tweetup!). Are any future missions planned to employ this technology, and are investments being made to scale this technology?
NASA(A)	Ion propulsion is going to be essential for outer planet missions, and may prove relevant for human missions.
MarcusF(Q)	Are there still big, concrete plans for human exploration beyond earth's orbit (returning to the moon, going to mars etc) amid budget cuts?
NASA(A)	The President has laid out goals for human exploration of the solar system. NASA is pursuing technologies that will bring us closer to achieving those goals.
jeffwallace(Q)	How do you forsee the cooperation and technology transfer (if any), between commercial investments and programs like SLS?
NASA(A)	Everything NASA does contributes to our economy. We don't spend any taxpayer money in space; we spend it right here on Earth. NASA has a stellar history of technology transfer, and you can learn some of these incredible stories if you go to spinoff.nasa.gov.
hooverrh(Q)	Will NASA be abandoning all plans to work with ESA on the ExoMars mission and other Mars missions?

NASA(A)	We are not supporting the specific ExoMars partnership as previously envisioned. But we are in discussions with our European partners on the best path forward in light of the current fiscal constraints.
micky(Q)	I am just a general public, Do we end up seeing any human exploration within next 3-4 years..
NASA(A)	We have six humans living and working on board the International Space Station 365 days a year, and we expect that will continue for many years. We are continuing to build the capability to expand the human presence in space at and beyond low Earth orbit.
jane(Q)	What are some of the latest contributions to life on earth made by NASA research?
NASA(A)	There are too many to list, but some examples are: improve weather forecasts; improve safety of first responders; medical imaging and diagnoses; improving the quality of baby formula; saving billions of dollars of fuel costs and the carbon footprint of airlines. And the list goes on - read more at spinoff.nasa.gov
davidfv(Q)	what are the highest priorities you see based on the roadmaps and how will NASA use those roadmaps?
NASA(A)	The NRC prioritized space technologies in a way that will help us starategically invest in NASA's future. Some examples are radiation protection for astronauts, space access and propulsion.
ernie(Q)	Can you give some examples of the synergies you see between science and human exploration? Many people view those as separate goals.
NASA(A)	Scientific and human exploration are both programs of discovery motivated by the human desire to explore our surroundings. Many of the technologies that enable science exploration can be pursued as development projects common to both, for example OCT is developing very light weight atmospheric entry technologies that can land larger science payloads more precisely and may even have a role in returning mass from the space station.
gwest(Q)	Will NASA be making changes to its scholarship and education programs?
NASA(A)	OCT inducted its first class of 80 space technology research fellows last year. The STRF program offers four years of support for graduate students. That program is continued in the FY13 budget request.
Km(Q)	Is it unrealistic to think that Humans will land on Mars and is something like this even a thought to NASA
NASA(A)	Landing humans on Mars is a tremendous challenge that requires many technological and scientific advances. We are taking on that challenge and plan to succeed. 50 years ago many thought it impossible to land a person on the Moon, but this was one of many successes in our storied history.
jane(Q)	what portion of NASA's annual budget is used toward r&d of sustainable energy?

NASA(A)	A great example is the recent Green Flight Challenge. NASA offered a prize purse of $1.6 million to inspire competitors to create an all-electric aircraft. A successful team made innovations in battery technology and motor technology and the systems engineering for aircraft that we expect will impact aviation for decades to come.
Sarah(P)	I've heard that NASA is launching smart phones into space. Is that true?
mmealling(Q)	wow.... *face palm*... are these questions/answers being completely written by PAO?
NASA(A)	The Chief Technologist and Chief Scientist are answering these questions directly. Check out the NASA facebook page. There is a picture of us answering your questions.
wepain(Q)	What do the workers of the Space Station exactly?
NASA(A)	Astronauts on the ISS conduct scientific experiments. They learn how to work better in space to prepare for future human missions. They test technologies, and they educate students around the world. They are learning how to maintain a spacecraft the size of 5-bedroom house.
mmealling(Q)	The recent National Research Council list of research priorities seems to de-emphasize technology development related to fuel depots. Is the technology development program working to advance that technology as a way of hedging future launch bets?
NASA(A)	NASA is working on cryogenic propellant storage and transfer technology. This development will have a lot of applications. In fact, we will be conducting a flight demonstation of this next generation technology in a few years because it directly relates to future science and human space missions.
NASA(P)	That's all the time we have today. Thanks so much for all your thoughtful questions. We know we didn't have time to answer all of them, but we appreciate your interest.
NASA(P)	You can always ask questions via @NASA or on our Facebook page.
NASA(P)	Thanks again and have a great day!